OM protein - protein search, using sw model

Run on: November 2, 2006, 09:35:01; Search time 196 Seconds

(without alignments)

27.993 Million cell updates/sec

Title: US-10-570-233-1

Perfect score: 59

Sequence: 1 LKATTNSKLMMY 12

Scoring table: BLOSUM62

Gapop 10.0 , Gapext 0.5

Searched: 2589679 seqs, 457216429 residues

Total number of hits satisfying chosen parameters: 960796

Minimum DB seq length: 0 Maximum DB seq length: 20

Post-processing: Minimum Match 0%

Maximum Match 100%

Listing first 100 summaries

Database: A Geneseq 8:\*

1: geneseqp1980s:\*

2: geneseqp1990s:\*

3: geneseqp2000s:\*

4: geneseqp2001s:\*

5: geneseqp2002s:\*

6: geneseqp2003as:\*
7: geneseqp2003bs:\*

8: geneseqp2004s:\*

9: geneseqp2005s:\*

10: geneseqp2006s:\*

Pred. No. is the number of results predicted by chance to have a score greater than or equal to the score of the result being printed, and is derived by analysis of the total score distribution.

			ક			*	
R	No.	Score	Query Match	Length	DB	ID	Description
	1	59	100.0	12	9	ADY73917	Ady73917 Transmiss
	2	29	49.2	15	2	AAW73902	Aaw73902 B. forsyt
	3	28	47.5	9	8	AD034138	Ado34138 Human CLA
	4	28	47.5	10	8	AD034198	Ado34198 Human CLA
	5	28	47.5	16	8	AD034054	Ado34054 Human CLA
	6	28	47.5	18	2	AAR53003	Aar53003 Example o
	7	28	47.5	20	9	ADW52300	Adw52300 Human PL
	8	27	45.8	15	9	ADY82781	Ady82781 Protein k
	9	27	45.8	19	4	AAM19389	Aam19389 Peptide #
	10	27	45.8	19	4	ABB38781	Abb38781 Peptide #
	11	27	45.8	19	4	AAM32253	Aam32253 Peptide #

, ; ·			·
<b>a</b> !			
12 13 14 15 16 17 18 19 20 21 22 23 24 25 26 27 28 29 30 31 32 33 34 35 36 37 38 39 40 41 42 43 44 45 46 47 48 49 50 50 50 50 50 50 50 50 50 50 50 50 50	27	19	Abb23817 Protein # Aam71978 Human bon Aam59420 Human liv Abg41793 Human pep Aed42223 Human pro Abr42329 Immunomod Adc36105 Chemokine Adr42853 Modulator Adz37998 Human kin Ad121992 125P5C8 p Ady82800 Protein k Aam49540 TRAS1 Pol Ady38558 Antigenic Aar29952 TCR pepti Ady64005 Human MCS Ady64005 Human MCS Adw76177 Feline FL Abm18906 S. pneumo Aee38860 Huwan ser Abp13660 HIV A02 s Ade65194 Corticotr Ade65193 Corticotr Ade65193 Corticotr Ade65193 Corticotr Ade651470 CRF2 non- Ade51478 CRF2 non- Ade51478 CRF2 non- Ade51478 CRF2 non- Ade51478 CRF2 non- Adg84912 Corticotr Adg84913 Corticotr Adg84914 Corticotr Adg84915 Corticotr Adg84916 Dricotr Adg84911 Corticotr Adg84912 Linear po Abol0721 Deimmunis Abr44665 Murine J4 Adu67921 Mouse ant Aea46178 Apolipopr Aed41822 Deimmuniz Aag64402 Human FX Aef01905 Ii-key/ H Aef01903 Ii-key/ H Aef02091 Ii-key/ H Aef01903 Ii-key/ H Aef02091 II-key/ H Aef01933 II-key/ H Aef01933 II-key/ H Aef01933 II-key/ H Aef01934 II-key
67	24 40.7	10 5 AAU93211.	Aab/3164 Tumour an Aau93211 Granulocy Adr12506 Anti-canc
· . 68 69 70	24 40.7 24 40.7 24 40.7	10 8 ADR12506 10 8 ADR47113 10 8 ADT90925	Adr12506 Anti-canc Adr47113 HLA-bindi Adt90925 Human sur
70 71 72	24 40.7 24 40.7 24 40.7	10 8 AD190923 12 2 AAW79554 12 8 ADQ81421	Adv79554 Adenoviru Adq81421 Negative

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73
         24
              40.7
                       14 2 AAR76658
                                                          Aar76658 Peptide d
 74
         24
              40.7
                       14 2 AAW18866
                                                          Aaw18866 65 kD Glu
 75
         24
              40.7
                       .14
                           6 ABJ38817
                                                          Abj38817 Human G-p
 76
         24 -
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 77
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                              ADW35735
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 78
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                              ADT37721
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                                                          Adx25056 Human pro
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### ALIGNMENTS

RESULT 1

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ΙD
     ADY73917 standard; peptide; 12 AA.
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AC
     ADY73917;
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DT
     02-JUN-2005 (first entry)
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DE
     Transmissible spongiform encephalopathy treating peptide, SEQ ID 1.
XX
KW
     transmissible spongiform encephalopathy; cerebroprotective;
KW
     neuroprotective; Creutzfeldt Jakob disease; CJD; kuru;
KW
     Gerstmann-Straeussler-Scheinker syndrome; insomnia; BSE; scrapie.
XX
OS
     Synthetic.
XX
PN
     WO2005023285-A2.
XX
PD
     17-MAR-2005.
XX
PF
     04-AUG-2004; 2004WO-DE001738.
XX
PR
     29-AUG-2003; 2003DE-01040260.
XX
PA
     (KERJ ) FORSCHUNGSZENTRUM JUELICH GMBH.
XX
PΙ
     Willbold D, Smolinski J, Haenel KO, Wolff MA, Riesner D, Korth C;
XX
```

```
WPI; 2005-233195/24.
XX
PT
     Agent for treating spongiform encephalopathy e.g. Jacob Creutzfeldt
PΤ
     syndrome, kuru, and Gerstmann-Straeussler-Scheinker syndrome, uses
PΤ
     peptides and/or nucleotide sequences coding for the peptides.
XX
PS
     Claim 1; SEQ ID NO 1; 33pp; German.
XX
CC
     The invention relates to a novel agent for the treatment or prevention of
CC
     transmissible spongiform encephalopathy (TSE) by using peptides and/or
     nucleotide sequences coding for the peptides. The invention further
CC
CC
     comprises: preparation of an agent as above; use of the peptides in for
CC
     manufacturing a medicament; treating or preventing transmissible
     spongiform encephalopathy (TSE), comprising administering an agent as above and/or the nucleic acids. The TSE treating agent has
CÇ
CC
CC
     neuroprotective activity. The agent can be used for treating or
CC
     preventing TSE, e.g. Creutzfeldt Jakob disease in humans, kuru, Gerstmann
CC
     -Straeussler-Scheinker syndrome, fatal familial insomnia (FFI), BSE in
CC
     cattle, scrapie in sheep and chronic wasting diseases (CWD) in wild
     animals. This sequence represents one of the novel peptides used in the
CC
CC
     TSE treating agent of the invention.
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SO
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                           100.0%; Score 59; DB 9; Length 12;
  Query Match
  Best Local Similarity 100.0%; Pred. No. 0.00016;
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                                                                    0;
  Matches
           12; Conservative
                                                   0;
                                                         Indels
                                                                        Gaps
0;
            1 LKATTNSKLMMY 12
Qу
              Db
            1 LKATTNSKLMMY 12
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AAW73902
ΙD
     AAW73902 standard; peptide; 15 AA.
XX
AC
     AAW73902;
XX
DT
     17-OCT-2003
                   (revised)
DT
     12-APR-1999
                   (first entry)
XX
DE
     B. forsythus protease fragment.
XX
KW
     Protease; haemolytic activity; diagnosis; periodontosis.
XX
OS
     Tannerella forsythensis.
XX
PN
     JP11009284-A.
XX
     19-JAN-1999.
PD
XX
PF
     25-JUN-1997;
                     97JP-00185849.
XX
PR
     25-JUN-1997;
                     97JP-00185849.
XX
     (SUNZ ) SUNSTAR CHEM IND CO LTD.
PA
XX
     WPI; 1999-145900/13.
DR
XX
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DR

```
New protease gene derived from Bacteroides forsythus - useful for
PT
     diagnosis and treatment of periodontosis.
XX
PS
     Disclosure; Page 13; 13pp; Japanese.
XX
     This sequence is a fragment of the Bacteroides forsythus protease of the
CC
     invention. The protein has protease activity and haemolytic activity. The
CC
     DNA and the polypeptide are useful for diagnosis, treatment and research
CC
CC
     of periodontosis. (Updated on 17-OCT-2003 to standardise OS field)
XX
SQ
     Sequence 15 AA;
  Query Match
                          49.2%;
                                  Score 29; DB 2; Length 15;
                          85.7%; Pred. No. 1.6e+02;
  Best Local Similarity
             6; Conservative
                                  0; Mismatches
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0;
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              1 1111
            4 TNNSKLM 10
Db
RESULT 3
ADO34138
ID
     ADO34138 standard; peptide; 9 AA.
XX
AC
     ADO34138;
XX
DT
     26-AUG-2004 (first entry)
XX
DĒ
     Human CLA2 HLA-A1 restricted peptide, SEQ ID 101.
XX
KW
     Cytostatic; human; Colorectal Lesion Associated 2; CLA2; chromosome 5p14;
KW
     proliferative disorder; tumour; cancer; carcinoma; dysplasia.
XX
OS
     Homo sapiens.
XX
PN
     EP1426442-A1.
XX
     09-JUN-2004.
PD
XX
PF
     02-DEC-2002; 2002EP-00026772.
XX
PR
     02-DEC-2002; 2002EP-00026772.
XX
PA
     (MTMM-) MTM LAB AG.
XX
PΙ
     Hipfel R;
XX
DR
     WPI; 2004-422595/40.
XX
PT
     New isolated colorectal lesion associated nucleic acid molecule useful in
PT
     the detection and therapy of proliferative disorders.
XX
PS
     Disclosure; SEQ ID NO 101; 123pp; English.
XX
CC
     The present invention relates to the human Colorectal Lesion Associated 2
CC
     (CLA2) gene (I; ADO34038), which is located on chromosome 5p14. CLA2
CC
     sequences are useful for the detection and treatment of proliferative
CC
     disorders such as: a benign and malignant tumour (head, neck, respiratory
CC
     tract, gastrointestinal tract, skin and its appendages, central and
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OM protein - protein search, using sw model

November 2, 2006, 09:44:20 ; Search time 51 Seconds Run on:

(without alignments)

20.595 Million cell updates/sec

US-10-570-233-1 Title:

Perfect score: 59

1 LKATTNSKLMMY 12 Sequence:

Scoring table: BLOSUM62

Gapop 10.0 , Gapext 0.5

Searched: 650591 segs, 87530628 residues

Total number of hits satisfying chosen parameters:

Minimum DB seq length: 0 Maximum DB seq length: 20

Post-processing: Minimum Match 0%

Maximum Match 100%

Listing first 100 summaries

Issued Patents AA:\* Database :

1: /EMC Celerra SIDS3/ptodata/2/iaa/5 COMB.pep:\*

2:

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/EMC\_Celerra\_SIDS3/ptodata/2/iaa/H\_COMB.pep:\* 3: 4:

/EMC Celerra SIDS3/ptodata/2/iaa/PCTUS COMB.pep:\* 5:

/EMC Celerra SIDS3/ptodata/2/iaa/RE COMB.pep:\* 6:

/EMC Celerra SIDS3/ptodata/2/iaa/backfiles1.pep: \*

Pred. No. is the number of results predicted by chance to have a score greater than or equal to the score of the result being printed, and is derived by analysis of the total score distribution.

Resul	-	Score	% Query Match	Length	DВ	ID	Description
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	2	30	50.8	13	1	US-08-170-114A-13	Sequence 13, Appl
	3	28	47.5	18	1	US-07-995-503A-9	Sequence 9, Appli
	4	28	47.5	18	1	US-08-390-510-9	Sequence 9, Appli
	5	28	47.5	18	1	US-08-390-790-9	Sequence 9, Appli
	6	28	47.5	18	1	US-08-390-509-9	Sequence 9, Appli
	7	28	47.5	. 18	2	US-09-149-860A-9	Sequence 9, Appli
	8	27	45.8	16	1	US-08-294-770A-12	Sequence 12, Appl
	9	27	45.8	16	1	US-08-448-735C-12	Sequence 12, Appl
-	LO	26	44.1	18	.2	US-08-637-670-42	Sequence 42, Appl
:	L1	26	44.1	19	2	US-09-011-143-10	Sequence 10, Appl
	L2	26	44.1	19	2	US-09-302-495-10	Sequence 10, Appl
:	L3	26	44.1	19	2	US-10-079-616-10	Sequence 10, Appl
	L 4	25	42.4	9	3	US-09-641-528B-332	Sequence 332, App

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OM protein - protein search, using sw model

November 2, 2006, 09:45:05; Search time 183 Seconds Run on:

(without alignments)

30.375 Million cell updates/sec

US-10-570-233-1 Title:

Perfect score: 59

1 LKATTNSKLMMY 12 Sequence:

BLOSUM62 Scoring table:

Gapop 10.0 , Gapext 0.5

2097797 seqs, 463214858 residues Searched:

Total number of hits satisfying chosen parameters: 460792

Minimum DB seq length: 0 Maximum DB seq length: 20

Post-processing: Minimum Match 0%

Maximum Match 100%

Listing first 100 summaries

Published Applications AA Main:\* Database :

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Pred. No. is the number of results predicted by chance to have a score greater than or equal to the score of the result being printed, and is derived by analysis of the total score distribution.

Re	esult No.	Score	% Query Match	Length	DB	ID	Description
	1	28	47.5	18	3	US-09-836-861-9	Sequence 9, Appli
	2	27	45.8	14	5	US-10-833-951-112	Sequence 112, App
	3	27	45.8	15	5	US-10-660-370-54	Sequence 54, Appl
	4	27	45.8	19	3	US-09-864-761-39115	Sequence 39115, A
	5	27	45.8	20	6	US-11-075-234-289	Sequence 289, App
	6	26	44.1	12	4	US-10-649-873-127	Sequence 127, App
	7	26	44.1	12	5	US-10-821-283-17	Sequence 17, Appl
	8	26	44.1	13	4	US-10-308-393-50	Sequence 50, Appl
	9	26	44.1	13	5	US-10-948-707-928 .	Sequence 928, App
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	13	26	44.1	19	4	US-10-324-143-118	Sequence 118, App
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	15	. 25	42.4	10	4	US-10-315-964A-495	Sequence 495, App

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OM protein - protein search, using sw model

Run on: November 2, 2006, 09:39:19; Search time 39 Seconds

(without alignments)

29.605 Million cell updates/sec

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Title: US-10-570-233-1

Perfect score: 59

Sequence: 1 LKATTNSKLMMY 12

Scoring table: BLOSUM62

Gapop 10.0 , Gapext 0.5

Searched: 283416 seqs, 96216763 residues

Total number of hits satisfying chosen parameters: 3886

Minimum DB seq length: 0 Maximum DB seq length: 20

Post-processing: Minimum Match 0%

Maximum Match 100%

Listing first 100 summaries

Database: PIR 80:\*

1: pir1:\* 2: pir2:\*

3: pir3:\*
4: pir4:\*

Pred. No. is the number of results predicted by chance to have a score greater than or equal to the score of the result being printed, and is derived by analysis of the total score distribution.

Result No.	Score	Query Match	Length	DB	ID	Description
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									•
	18	20	33.9	20	2	PC4384			DnaK protein homol
	19	19	32.2	9	2	A28924			
	20	19	32.2						fructose-bisphosph
	21			10	2	PH0894			T-cell receptor be
		19	32.2	15	2	PH0797			T-cell receptor al
	22	19	32.2	15	2	E49037			TcR delta chain V-
	23	19	32.2	20	2	S38763			S-adenosyl-L-methi
	24	18	30.5	10	2	S74176			gluconokinase (EC
	25	18	30.5	13	2	S57567			T cell receptor V-
	26	18	30.5	14	2	PH0801			T-cell receptor al
	27	18	30.5	16	2	A27.803			myosin light chain
	28	18	30.5	16	2	PH0766		1	T-cell receptor be
	29	18	30.5	16	2	S35627			uvsX protein - pha
	30	18	30.5	17	2	I49593			cystic fibrosis tr
	31	18	30.5	17	2	I84733			gene CFTR protein
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	34	18	30.5	19	2	A49725			valine-tRNA ligase
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	67	16	27.1	11	2	YHJFHY			morphogenetic neur
	68	16	27.1	11	2	YHXAE			morphogenetic neur
	69	16	27.1	11	2	YHRT			morphogenetic neur
	70	16	27.1	12	2	S11298			hemagglutinin prec
	71	16	27.1	. 13	2	H64124			hypothetical prote
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	73	16	27.1	13	2	PH0799			T-cell receptor al
	74	16	27.1	13	2	A23695			myosin heavy chain
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	77	16	27.1	14	2	PH1768			T cell receptor al
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OM protein - protein search, using sw model

Run on: November 2, 2006, 09:45:59; Search time 41 Seconds

(without alignments)

24.511 Million cell updates/sec

US-10-570-233-1 Title:

Perfect score: 59

1 LKATTNSKLMMY 12 Sequence:

Scoring table: BLOSUM62

Gapop 10.0 , Gapext 0.5

Searched: 320231 seqs, 83745634 residues

Total number of hits satisfying chosen parameters: 56157

Minimum DB seq length: 0 Maximum DB seq length: 20

Post-processing: Minimum Match 0%

Maximum Match 100%

Listing first 100 summaries

Published\_Applications\_AA\_New:\* Database :

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4:

5:

/EMC\_Celerra\_SIDS3/ptodata/1/pubpaa/US10\_NEW\_PUB.pep:\*/EMC\_Celerra\_SIDS3/ptodata/1/pubpaa/US11\_NEW\_PUB.pep:\* 6: 7:

/EMC\_Celerra\_SIDS3/ptodata/1/pubpaa/US60\_NEW\_PUB.pep:\*

Pred. No. is the number of results predicted by chance to have a score greater than or equal to the score of the result being printed, and is derived by analysis of the total score distribution.

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2	26	44.1	13	7	US-11-376-695-928	Sequence 928, App
3	26	44.1	20	7	US-11-134-871-2964	Sequence 2964, Ap
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6	24	40.7	9	6	US-10-537-642-124	Sequence 124, App
7	24	40.7	14	7	US-11-397-759-35	Sequence 35, Appl
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#### · ALIGNMENTS

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; Publication No. US20060210573A1
; GENERAL INFORMATION:
  APPLICANT: CURE TECH LTD.
  APPLICANT: MOR-RESEARCH APPLICATIONS LTD.
  APPLICANT: HARDY, Britta
              RAITER, Annat
  APPLICANT:
  APPLICANT: KLAPPER, Leah
  TITLE OF INVENTION: PEPTIDES USEFUL IN IMMUNOMODULATION
  FILE REFERENCE: 85189-6100 -
  CURRENT APPLICATION NUMBER: US/11/411,832
  CURRENT FILING DATE: 2006-04-27
  PRIOR APPLICATION NUMBER: US/10/821,283
  PRIOR FILING DATE: 2004-04-09
  PRIOR APPLICATION NUMBER: PCT/IL02/00831
  PRIOR FILING DATE: 2002-10-15
  PRIOR APPLICATION NUMBER: IL 145926
  PRIOR FILING DATE: 2001-10-15
  NUMBER OF SEQ ID NOS: 33
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 SEQ ID NO 17
   LENGTH: 12
   TYPE: PRT
   ORGANISM: Artificial
    FEATURE:
   OTHER INFORMATION: recombinant peptide recognized by the BAT-1 monoclonal
antibody
US-11-411-832-17
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                                                                   0; Gaps
0;
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Qу
              ||\cdot||\cdot||
Db
            5 TNTKLM 10
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US-11-376-695-928
; Sequence 928, Application US/11376695
; Publication No. US20060234909A1
; GENERAL INFORMATION:
  APPLICANT: Ballatore, Carlo
  APPLICANT: Castellino, Angelo
   APPLICANT:
              Desharnais, Joel
   APPLICANT: Guo, Zijian
   APPLICANT:
               Li, Qing ·
               Newman, Michael James
   APPLICANT:
   APPLICANT:
               Sun, Chengzao
   TITLE OF INVENTION: COMPOSITIONS AND METHODS FOR INCREASING
   TITLE OF INVENTION: DRUG EFFICIENCY
   FILE REFERENCE: 11685-0009-999
   CURRENT APPLICATION NUMBER: US/11/376,695
   CURRENT FILING DATE: 2006-03-14
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   PRIOR FILING DATE: 2004-09-22
   PRIOR APPLICATION NUMBER: 60/505,325
   PRIOR FILING DATE: 2003-09-22
   PRIOR APPLICATION NUMBER: 60/568,340
   PRIOR FILING DATE: 2004-05-04
   PRIOR APPLICATION NUMBER: 60/581,835
   PRIOR FILING DATE: 2004-06-22
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  SEQ ID NO 928
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    TYPE: PRT
    ORGANISM: Homo Sapiens
US-11-376-695-928
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Qу
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Db
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; Sequence 2964, Application US/11134871
; Publication No. US20060141528A1
; GENERAL INFORMATION:
; APPLICANT: Aebersold, Rudolf H.
; APPLICANT: Zhang, Hui
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OM protein - protein search, using sw model

Run on: November 2, 2006, 09:35:55; Search time 297 Seconds

(without alignments)

37.374 Million cell updates/sec

Title: US-10-570-233-1

Perfect score: 59

Sequence: 1 LKATTNSKLMMY 12

Scoring table: BLOSUM62

Gapop 10.0 , Gapext 0.5

Searched: 2849598 seqs, 925015592 residues

Total number of hits satisfying chosen parameters: 16145

Minimum DB seq length: 0 Maximum DB seq length: 20

Post-processing: Minimum Match 0%

Maximum Match 100%

Listing first 100 summaries

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2: uniprot\_trembl:\*

Pred. No. is the number of results predicted by chance to have a score greater than or equal to the score of the result being printed, and is derived by analysis of the total score distribution.

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	2	25	42.4	16	2	Q3ZEYO <sup>-</sup> 9CHAR	Q3zey0 actitis hyp
	3	24	40.7	. 13	2	Q35793 YEAST	Q35793 saccharomyc
	4	23	39.0	20	2	Q41475_SOLTU	Q41475 solanum tub
	5	22	37.3	10	. 2	P82223 BOMMO	. P82223 bombyx mori
	6	22	37.3	13	2	Q42373_SOLTU	Q42373 solanum tub
	7	22	37.3	16	2	Q3ZEV7_9CHAR	Q3zev7 tringa stag
	8	22	37.3	18	2	Q4YR78_PLABE	Q4yr78 plasmodium
	9	22	37.3	18	2	Q7RMW9_PLAYO	Q7rmw9 plasmodium
	10	22	37.3	19	2	Q41466_SOLTU	Q41466 solanum tub
	11	22	37.3	19	2	Q41471_SOLTU	Q41471 solanum tub
	12	22	37 <sup>.</sup> .3	19	2	Q9R4B9_STRSP	Q9r4b9 streptococc
	13	22	37.3	20	2	Q41468_SOLTU	. Q41468 solanum tub
	14	22	37.3	. 20	2	Q41469_SOLTU	Q41469 solanum tub
	15	21	35.6	12	2	P82334_PEA	P82334 pisum sativ
	16	21	35.6	13	2	Q7SCD5_NEUCR	Q7scd5 neurospora
	17	21	35.6	13	2	Q9ZEZ1 9ENTR	· Q9zez1 buchnera ap
	18	21	35.6	16	2	Q75MY2_HUMAN	Q75my2 homo sapien
	19	21	35.6	16	2	Q6JDH9_CANFA	Q6jdh9 canis famil

20       21       35.6       17       1         21       21       35.6       19       2         22       21       35.6       20       2         23       21       35.6       20       2         24       21       35.6       20       2         25       20       33.9       10       2         26       20       33.9       11       2         27       20       33.9       12       2         28       20       33.9       12       2         29       20       33.9       15       1         30       20       33.9       15       1         31       20       33.9       15       2         32       20       33.9       15       2         33       20       33.9       15       2         34       20       33.9       16       1         35       20       33.9       17       2         36       20       33.9       17       2         37       20       33.9       17       2         38       20 <td< th=""><th>ALYS MYCPH Q4X4T2 PLACH Q7DMVO_SOLTU Q9PRM4_CHICK Q9PS38_RANCA Q8VIL8_MOUSE Q9R790_BORGA Q5DU72_PIG Q56QW1_9PHAE Q9MRF6_9POAL DNAK_COMAC O05463_9PROT P97249_9MURI FIBA_VULVU Q9S898_LYCES Q9UML8_HUMAN Q4X4S0_PLACH Q7M2M4_BOVIN Q6PUY6_9HEPC PH1_PERAM Q5EBR8_HUMAN O46665_MACRO P79435_HYLLA Q7JF17_MACFA Q7JF18_SAISC Q7JF19_BOVIN Q65ZT5_BORGA Q4XQY2_PLACH P97555_RAT DNAK_CLOPA DNAK_THIFE Q4XB58_PLACH Q4XK96_PLACH Q7M1A4_ACISP Q9PS14_ONCKI Q4YSC2_PLABE Q7M2K6_RABIT Q9L4F7_BACCE Q7Y9B6_9SAUR Q7Y9D1_9SAUR Q9G679_HYPDL Q7RH59_PLAYO Q9TTE3_PIG</th><th>P81528 mycobacteri Q4x4t2 plasmodium Q7dmv0 solanum tub Q9prm4 gallus gall Q9ps38 rana catesb Q8vi18 mus musculu Q9r790 borrelia ga Q5du72 sus scrofa Q56qw1 undaria pin Q9mrf6 hordeum mur P83709 comamonas a 005463 nitrosospir Q9qva9 rattus sp. P68212 vulpes vulp Q9s898 lycopersico Q9um18 homo sapien Q4x4s0 plasmodium Q7m2m4 bos taurus Q6puy6 hepatitis c P82694 periplaneta Q5ebr8 homo sapien 046665 macropus ro P79435 hylobates l Q7jfi7 macaca fasc Q7jfi8 saimiri sci Q7jfi9 bos taurus Q65zt5 borrelia ga Q4xqy2 plasmodium P97555 rattus norv P81341 clostridium P83724 naegleria f P29133 thiobacillu Q4xb58 plasmodium Q4xk96 oryctolagus Q914f7 bacillus ce Q7y9b6 amphiboluru Q7y9d1 tympanocryp Q9g679 hypsilurus Q7rh59 plasmodium Q7rh59 plasmodium Q9tte3 sus scrofa</th></td<>	ALYS MYCPH Q4X4T2 PLACH Q7DMVO_SOLTU Q9PRM4_CHICK Q9PS38_RANCA Q8VIL8_MOUSE Q9R790_BORGA Q5DU72_PIG Q56QW1_9PHAE Q9MRF6_9POAL DNAK_COMAC O05463_9PROT P97249_9MURI FIBA_VULVU Q9S898_LYCES Q9UML8_HUMAN Q4X4S0_PLACH Q7M2M4_BOVIN Q6PUY6_9HEPC PH1_PERAM Q5EBR8_HUMAN O46665_MACRO P79435_HYLLA Q7JF17_MACFA Q7JF18_SAISC Q7JF19_BOVIN Q65ZT5_BORGA Q4XQY2_PLACH P97555_RAT DNAK_CLOPA DNAK_THIFE Q4XB58_PLACH Q4XK96_PLACH Q7M1A4_ACISP Q9PS14_ONCKI Q4YSC2_PLABE Q7M2K6_RABIT Q9L4F7_BACCE Q7Y9B6_9SAUR Q7Y9D1_9SAUR Q9G679_HYPDL Q7RH59_PLAYO Q9TTE3_PIG	P81528 mycobacteri Q4x4t2 plasmodium Q7dmv0 solanum tub Q9prm4 gallus gall Q9ps38 rana catesb Q8vi18 mus musculu Q9r790 borrelia ga Q5du72 sus scrofa Q56qw1 undaria pin Q9mrf6 hordeum mur P83709 comamonas a 005463 nitrosospir Q9qva9 rattus sp. P68212 vulpes vulp Q9s898 lycopersico Q9um18 homo sapien Q4x4s0 plasmodium Q7m2m4 bos taurus Q6puy6 hepatitis c P82694 periplaneta Q5ebr8 homo sapien 046665 macropus ro P79435 hylobates l Q7jfi7 macaca fasc Q7jfi8 saimiri sci Q7jfi9 bos taurus Q65zt5 borrelia ga Q4xqy2 plasmodium P97555 rattus norv P81341 clostridium P83724 naegleria f P29133 thiobacillu Q4xb58 plasmodium Q4xk96 oryctolagus Q914f7 bacillus ce Q7y9b6 amphiboluru Q7y9d1 tympanocryp Q9g679 hypsilurus Q7rh59 plasmodium Q7rh59 plasmodium Q9tte3 sus scrofa
58 19 32.2 9 2	Q7M2K6_RABIT	Q7m2k6 oryctolagus
60 19 32.2 11 2	Q7Y9B6_9SAUR	Q7y9b6 amphiboluru
63 19 32.2 12 2	Q7RH59_PLAYO	Q7rh59 plasmodium
65 19 32.2 13 1 66 19 32.2 13 2	FRI2_PEA Q9SB03_ORYSA	P83445 pisum sativ Q9sb03 oryza sativ
67 19 32.2 15 2 68 19 32.2 16 2	Q9UCE5_HUMAN Q6Y662_MYCML	Q9uce5 homo sapien Q6y662 mycoplasma
69	Q765Z2_CHICK Q9PSL6_CHICK Q75146_ORYSA	Q765z2 gallus gall Q9ps16 gallus gall Q75i46 oryza sativ
72	Q5BY25_SCHJA DCAM ACACA	Q5by25 schistosoma P34039 acanthamoeb
74 19 32.2 19 1 75 19 32.2 19 2	PHLC_STAIN Q2TD78 9HYME	P80924 staphylococ Q2td78 solenopsis
76 19 32.2 19 2 77 19 32.2 19 2	Q4Y2D0_PLACH Q4YLL6_PLABE	Q4y2d0 plasmodium Q4y116 plasmodium
78 19 32.2 19 2 79 19 32.2 19 2 80 19 32.2 20 2	Q5C169_SCHJA Q9TWH8_PARCM	Q5c169 schistosoma Q9twh8 paralithode

1

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81
            19
                   32.2
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                                                                              P79837 prionailuru
                                20 2 Q42486 SOLTU
 82
            19
                   32.2
                                                                               Q42486 solanum tub
                                20 2 Q47598_ECOLI
20 2 Q56130_SALTY
20 2 Q9K2Y9_MYCMC
20 2 Q9K2Z0_MYCMC
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                                                                              Q47598 escherichia
            19
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 84
 85
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20 2 Q9PRN6_SCYCA
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12 2 Q85498_9RETR
12 2 Q8AEW7_9HIV1
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 92
           19
                  32.2
                                                                              Q9kjq8 mycoplasma
 93
           19
                   32.2
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32.2
32.2
32.2
30.5
30.5
30.5
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                                                                              Q9kjr2 mycoplasma
 94
 95
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                                                                              Q418q1 staphylococ
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100
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#### ALIGNMENTS

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RESULT 1
P82224 BOMMO .
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DT
    01-OCT-2001, integrated into UniProtKB/TrEMBL.
    01-OCT-2001, sequence version 1. 07-FEB-2006, entry version 10.
DT
DT
    Unknown protein from 2D-page (Fragment).
DE
OS
    Bombyx mori (Silk moth).
    Eukaryota; Metazoa; Arthropoda; Hexapoda; Insecta; Pterygota;
OC
    Neoptera; Endopterygota; Lepidoptera; Glossata; Ditrysia; Bombycoidea;
OC
OC
    Bombycidae; Bombyx.
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OX
RN
RP
     PROTEIN SEQUENCE.
     STRAIN=XINHANG X KEMING; TISSUE=Body wall, and Fat body;
RC
    MEDLINE=21177481; PubMed=11280994;
RX
RA
     Zhong B.X.;
     "Protein database for several tissues derived from five instar of
RT
RT
     silkworm.";
RL
    Yi Chuan Xue Bao 28:217-224(2001).
CC
     _____
     Copyrighted by the UniProt Consortium, see http://www.uniprot.org/terms
CC
     Distributed under the Creative Commons Attribution-NoDerivs License
CC
     ______
CC
     NON TER 10 10
FT
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SQ
 Query Match 42.4%; Score 25; DB 2; Length 10; Best Local Similarity 50.0%; Pred. No. 5.2e+02; Matches 5; Conservative 3; Mismatches 2; Indels 0; Gaps
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Qy
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              | | |:||::
         · 1 LPAVTHSKVL 10
Db
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AC
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DT
     27-SEP-2005, integrated into UniProtKB/TrEMBL.
     27-SEP-2005, sequence version 1.
DT
     07-FEB-2006, entry version 3.
DT
     ATP synthase FO subunit 8 (Fragment).
DE
GN
     Name=ATP8;
OS
     Actitis hypoleucos (common sandpiper).
OG
     Mitochondrion.
     Eukaryota; Metazoa; Chordata; Craniata; Vertebrata; Euteleostomi;
OC
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OC
OX
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RN
     [1]
RP
     NUCLEOTIDE SEQUENCE.
     Pereira S.L., Baker A.J.;
RA
RT
     "Multiple gene evidence for parallel evolution and retention of
     ancestral morphological states in the shanks (Charadriiformes:
RT
RT
     Scolopacidae).";
RL
     Condor 107:514-526(2005).
CC
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CC
     Distributed under the Creative Commons Attribution-NoDerivs License
CC
DR
     EMBL; AY894263; AAX93990.1; -; Genomic DNA.
DR
     GO; GO:0005739; C:mitochondrion; IEA.
KW
     Mitochondrion.
FT
     NON TER
SO
     SEQUENCE
                16 AA; 1961 MW; 693F802BC211E86D CRC64;
  Query Match
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                           36.4%; Pred. No. 8.6e+02;
 Best Local Similarity
 Matches
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          4; Conservative
                                                                   0; Gaps
0;
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Qу
              1:11:1 ::
            1 KTSTNTKTTLW 11
Db
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DT
     01-NOV-1996, integrated into UniProtKB/TrEMBL.
     01-NOV-1996, sequence version 1. 07-FEB-2006, entry version 16.
DT
DT
DE
     Inside intron 4 (Fragment).
     Saccharomyces cerevisiae (Baker's yeast).
os
OG
     Mitochondrion.
     Eukaryota; Fungi; Ascomycota; Saccharomycotina; Saccharomycetes;
OC
OC
     Saccharomycetales; Saccharomycetaceae; Saccharomyces.
OX
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RN
RP
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RC
     STRAIN=D273-10B;
RX
     MEDLINE=81069885; PubMed=6254986;
RA
     Bonitz S.G., Coruzzi G., Thalenfeld B.E., Tzagoloff A., Macino G.;
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